James Wensley, Transit Consultant to the City of Alexandria, writes:

The draft Transportation Management Plan (TMP) for BRAC 133 at Mark Center was recently released for public review. This memo reviews the TMP and offers comments from the perspective of the impact on bus transit operations in Alexandria. Specifically, the plan was examined for any effects it might have on the previously completed analysis of bus service to BRAC 133, including the assumed geographic distribution of transit commuters and suggested bus routing changes.

The plan covers several aspects of existing transportation patterns, future demand arising out of the relocation and the planned strategies to regulate and reduce traffic and vehicle trips. Compared to several other TMPs prepared for BRAC sites in the region, the BRAC 133 TMP is among the more comprehensive plans, especially due to the extensive analysis of employee residences by zip code and jurisdiction, discussion of transit options and the inclusion of a parking management plan. The final TMP will also include a shuttle program to serve a major portion of BRAC 133 employees accessing the facility by Metrorail.

This document describes the structure of the plan and elaborates on the strategies used for travel demand management, which form the salient features of the TMP. The traffic analysis in the TMP offers some recommendations which may potentially affect transit operations. These recommendations have been reviewed in a separate section. Key observations regarding the TMP are provided at the end.

Structure of the TMP

The TMP is structured as follows:

- The introduction section includes the history of the project, the purpose, goal and objectives of the TMP.
- Section 2 discusses employee relocation and travel characteristics. Employee zip code data
 obtained from human resources records for all federal employees as well as survey results
 from an August 2009 WHS commuter survey targeting relocating employees was used to
 determine residential locations and existing modal split at a jurisdiction level. Employee trip
 generation from previous studies and regional travel patterns were also studied. Projected
 future modal splits and assumptions are discussed.
- The next section describes the site conditions with respect to both existing and future conditions. The discussion covers physical site and land use, access to the site and within the site, planned access control facilities, and pedestrian access and facilities. Various commuting modes including bus transit service, slug lines, shuttle service and parking (as a determinant of SOV driving, carpooling and vanpooling) are discussed in context of existing availability and planned improvements to serve the relocation.
- The traffic impact analysis section summarizes previous traffic studies for the site, and describes the traffic analysis conducted as part of the TMP and identifies projected problem areas. The section provides a list of recommended solutions including roadway, intersection and traffic control improvements. Employee concerns and concerns voiced by citizens and neighborhood associations as well as the response to address these have also been listed.
- The last section, the Travel Demand Management Plan describes the various strategies that WHS and other concerned organizations will implement to meet the TMP goals and objectives. These strategies have been described in the next section.

Travel Demand Management Plan

The BRAC 133 TMP strategies build on the existing Mark Center TMP strategies for the site, treating them as an essential requirement to meet. WHS will establish a transportation Management Program office onsite which will be managed by at least one transportation coordinator. The role of the transportation coordinator has been extensively described. Outreach efforts aimed at employees are ongoing and will be expanded as the relocation nears. Every BRAC 133 employee will be encouraged to

pre-register and enroll in the TMP including those planning to drive alone.

Employee surveys form an important part of determining the direction of the transportation demand management effort. The survey conducted in the fall of 2009 gauged employee interest and participation

in various commute-related programs. More surveys are planned in July 2010 and the winter of 2010 to

note changes in commuting patterns as employees will be equipped with better knowledge about the various transportation options available to them after the relocation. This would in turn, help WHS model and revise their TMP and modal targets.

To promote alternative modes to driving the TDM plan extends the public transit program to BRAC 133 employees. Employees who indicated that they intend to use transit as their primary mode of commute qualify for the Mass Transportation Benefit Program, and would receive transit subsidies in amounts equal to their personal commuting costs, not to exceed the amount as determined by law. Vanpool participants also qualify for this program.

TDM strategies also discuss midday travel and available transportation options, the bike and pedestrian program, variable Work Hour/ Flex time and compressed work week which are aimed at reducing traffic congestion in and around BRAC 133 during the week.

The most significant strategies of the TDM plan that are particularly important given the future site conditions at BRAC 133, have been described in detail below:

Parking Management

Pentagon Force Protection Agency Parking Management Branch (PFPA PMB) will be in charge of managing all parking operations, including parking permit allocation and distribution of permits. Parking spaces will be allotted to tenant organizations according to the percent of total employee strength that the organization houses in BRAC 133. There will be as many parking permits as the parking spaces allotted. The tenant organization is responsible for distributing general use parking permits. For receiving a permit, the employee would need to fill out an online application with required information which would be reviewed by the supervisor. A parking permit may be granted if the employee meets given criteria (i.e., does not desire to receive a mass transit benefit subsidy). Allotment is on a first come first serve basis, until the permits are exhausted. Parking permits will be numbered

and color coded based on the type of parking and the parking garage where the permit is valid. Permits can be valid for only one garage.

Priority parking will be provided for carpool, vanpool, or low/no-emission vehicles. A minimum of 320

carpool/vanpool priority parking spaces will be reserved in North Parking Garage closest to the pedestrian bridge to eliminate dwell time at the security checkpoint. However there is no cap on carpool parking; if demand for carpool/vanpool spaces is higher, spaces from the general use permit parking will be freed up to meet the demand. Qualified carpools must have at least two DoD employees riding in the vehicle to in addition to a BRAC 133 employee driver. If a significant demand for parking spaces for

two-person carpool arises, PFPA PMB will consider allotting permits for these vehicles.

For low/no-emission vehicle parking spaces, priority parking will be located in the South Parking

Garage closest to the entrance of the building. This parking will be capped at 192 spaces.

All employees driving alone or those participating in a carpool, including the riders, must waive their right to the mass transit benefit subsidy in order to obtain the carpool parking permit. In the case of a carpool, the driver applies for the permit and provides the names of the designated riders. PFPA PMB verifies the riders of the carpool. (It is not clear whether carpool members can take turns driving or the same driver must drive every day.)

PFPA PMB officers will enforce permit requirements by conducting random phone calls to riders to ensure they are still members of the carpool/vanpool as well as through surveillance of carpools and vanpools into and out of the parking garage.

Although the majority of parking near the facility is permit or access controlled, some street and

off-street parking may be impacted by spillover from BRAC 133, necessitating some overflow

management. While PFPA PMB is responsible only for the management of Army-owned property and parking facilities, the TMP lists a few strategies which the neighboring properties can implement to reduce the impact of spillover parking. WHS will maintain a BRAC 133 building management hotline for community members to voice a complaint about frequent parking violations.

During special events organized at BRAC 133, visitors will be required to board a DoD shuttle from a designated Metrorail pick up point. For visitors from outside the region, WHS will make arrangements with hotels nearby. At other occasions visitors will be required to register in advance and receive approval from PFPA, at least one day prior to visiting the site. When arriving at the site, the visitor credentials will be verified before being permitted into the visitor parking area.

The Shuttle Program

WHS is currently in the process of planning the DoD BRAC 133 shuttle program. General requirements of the program are as follows: providing capacity to support a 20 to 40 percent transit mode share;

providing 10-minute or 15-minute headways during peak hours; and providing connections to Metrorail

Orange, Yellow, and Blue Lines, as well as VRE.

Various alternatives for connections to key Metrorail stations are being considered. At a minimum there will be service between BRAC 133 and the Pentagon and the King Street Metro Station.

The preferred option proposes weekday service from 5:30 AM to 8:30 PM, with 10-minute or 15-minute

headways during peak hours (6:30 AM to 9:30 AM and 3:30 PM to 6:30 PM) and 30-minute headways

during off-peak hours. Vehicles used will vary between 25- passenger vehicles, 35-passenger vehicles,

and 45-passenger vehicles. The size will be determined by the route and/or time of day.

The TMP recognizes that the exact demand at each Metrorail station cannot be ascertained at this time, and hence WHS will monitor the use of the shuttles on a periodic basis and make required adjustments.

The monitoring and evaluation component described below provides a timeline for studying ridership

trends. On-board passenger counters on each vehicle will be used for data collection.

Monitoring and Evaluation plan

The Transportation Coordinator(s) will conduct surveys of employees 6 months after relocation, 1 year after relocation, annually after the first year of program operations for three years and biannually after that. The purpose of the survey will be to measure TMP progress in meeting its goals and objectives as well as determine the effectiveness of TMP programs. The monitoring process will also include vehicle and trip count at major intersections. The evaluation report will include performance measures like Average Vehicle Ridership, Parking Utilization, and mode split. Results from the evaluation may warrant suitable amendments and updates to the TMP.

Roadway and Traffic Related Improvements - Impact on Transit

Some of the planned site access improvements such as an additional left turn lane from westbound

Seminary Road to southbound North Beauregard Street; additional southbound-to-eastbound left-turn

lane at the North Beauregard Street and Mark Center Drive intersection would provide additional capacity for general traffic as well as buses and shuttles which would utilize these turns to access the transportation center. Additionally, the proposed routing for some of the bus routes require the bus to make a clockwise loop around the Transportation Center, just after turning into Mark Center Drive from Seminary Road. It was necessary to ensure that this is possible given the BRAC 133 site configuration of access points to the south and north garage and the layout of other facilities. The layout as presented in the TMP does not preclude the proposed routing of the buses around the site.

In the traffic analysis section, the traffic operational analysis and simulation modeling results for projected peak hour demand due to BRAC 133 note deteriorating levels of service at several locations in the vicinity of the site. Key recommendations have been presented in the TMP. Most of these increase capacity and reduce congestion in general, which also benefits public transit.

However, recommended intersection improvements that seek to eliminate northbound left turns from the Seminary Road and Beauregard Street intersection, also suggest eliminating all southbound left turns from N Beauregard Street into Southern Towers and redirecting them to turn left on Seminary Road and accessing Southern Towers via the Mark Center Drive intersection. This turn is utilized by Metrobus Routes 7AF, 7B, 7E, 28A and 25B to serve Southern Towers. The turn prohibition would add time to every trip, adversely impacting the headway and schedule and possibly resulting in the need to eliminate one of the three Southern Towers stops on these routes.

Key Observations

Non DoD or Contractor Employees

The BRAC 133 Transportation Management Plan offers an extensive and detailed document that provides analysis of projected commuting patterns and traffic generation and a comprehensive list of strategies to meet target modal splits. However, the TMP does not address transportation demands and impacts created by the non-DoD/contractor staff that would be employed at the same premises. Such staff would include food service, maintenance and housekeeping employees and are anticipated to form a significant number. By not addressing them anywhere in the plan, the plan implies a 100 percent transit mode share for these employees, which is very unrealistic. Accounting for these occupants would affect parking strategies, traffic generation, estimated transit ridership and transit service needs.

Parking Allocation

While the parking management plan is the highlight of the TMP, the final distribution of parking spaces or parking permits among employees is determined by the tenant organization. The criteria for determining eligibility for a parking space still remain unclear. Tenant organizations are free to develop their own criteria. There is nothing in the TMP that would require these organizations to consider transit access, or lack thereof, as one of the criteria in allocating parking resources. The TMP does not suggest any parking allocation policy that would affect the geographic distribution of transit riders and thus impact the expected number of transit commuters arriving from each of the several Metrorail and bus transit access points.

Impacts on Bus Operations

The traffic and roadway recommendations should be re-examined in the context of transit operations in the vicinity. The site will receive numerous buses and shuttles throughout the day, improvements that reduce or eliminate delays and do not preclude proposed bus routings would help maintain a desired level of service for transit operations. The final TMP should identify new shuttle bus routings in the vicinity of BRAC 133 and incorporate proposed bus routing changes that have been approved by DASH, WMATA and the City of Alexandria. Also, any new traffic signals should be able to accommodate future transit signal priority.

Christopher Arabia, Manager of Mobility Programs, Virginia Department of Rail and Public Transportation, Richmond VA, writes:

Overall the TMP is good, but a bit optimistic.

The SOV trip reductions rely mainly on the fact that there are only 3,747 employee and visitor parking spaces for 6,409 employees. However, I don't think they did enough analysis on parking near the facility. People will find parking where you least expect. There is a shopping center near the facility where employees will try to park.

The 3% slugging use by creating a slug line is optimistic. Slugging works for the Pentagon and DC because there is density and access to transit to get to other destinations. I don't there will be that much slugging. Plus, there is no HOV lane access to the facility. Carpooling and vanpooling will also be hurt by the lack HOV lane access.

Also, I think the transit use projections are high. Mark Center isn't well service by transit. The Mark Center shuttle and the proposed DoD shuttle to Metro and VRE will help, but there isn't much in the way of bus service to Mark Center. The TMP basis a lot of the projected transit use on the number of existing employees that use transit now. However, the existing employees work at sites that have much better transit access and, for may are one-seat rides. I doubt many people will take the bus to the apartment complex on the other side of Seminary Road and walk to the facility - too dangerous and too long of a walk.

The vanpool use projection may be a bit high due to DoD's transit/vanpool benefit program that prohibits employees riding in vanpools operated by non-profit vanpool companies from receiving the benefit. Many of the vanpool companies in Virginia are non-profit. DoD needs to change their policy on this in order to have more employees use vanpools. Also, there policy is incorrect and may violate federal rules by discriminating against non-profit vanpool companies.

The plan needs more emphasis telework and commit DoD to meeting the federal telework goals.

Carolyn Griglione, City of Alexandria Resident, writes:

- 1. What is the anticipated number of shuttle buses that will be leaving the King Street Metro Station in the morning and the number returning in the afternoon?
- 2. On page ES-3, what is meant by "BRAC growth' in the middle of the page? Are there more buildings planned for the BRAC-133 site?
- 3. How will the Washington Headquarters Services (WHS) support and assist the neighborhood residents of the BRAC-133 site? Pg ES-3
- 4. How many ideas and recommendations from the BRAC Advisory Group has become part of the plan? Pg. 3
- 5. How will 'continued and ongoing communication with area residents' take place once the site is occupied? Will there be a phone number for residents to call when they need assistance with a BRAC-133 issue (parking, trash, etc.)? Pg. 3
- 6. What is the WHS planned 'outreach to residents'? Pg. 7
- 7. What are the 'measures to monitor achievement of goals and to adjust the SOV trip reduction strategies, as needed'? Pg. 3
- 8. What is meant by 'proper alignment with *future development* plans in this area'? Pg. 3
- 9. What happens if 'striving for a 40 percent reduction of SOV trips to the BRAC-133 site in order to minimize traffic impacts on the neighboring community' does not happen? What is the contingency plan?
- 10. Who is responsible for enforcing the parking rules for BRAC-133 employees in residential and business areas?
- 11. Where are residents and neighboring communities in Fig. 2-1: Organizational Chart? Pg. 8
- 12. Who is responsible for the over site of the non-federal employees (30%)? Pg. 8
- 13. Is there a possibility that those driving cars will pick commuters up at Metro locations thus diminishing the number of shuttle riders? Pg. 11
- 14. Is there the possibility that shuttle buses will pick employees up at locations other than Metro stations?
- 15. Where will the VRE riders exit the train? Will this require additional shuttle buses? Pg. 14, Pg. 17

- 16. What will the impact on traffic be when one shift leaves and one shift arrives? Will this happen within the same time frame?
- 17. What are the plans for 'spillover' parking? Pg. 17
- 18. What is the 'outdoor' environmental quality standard? AC generator noise, transportation noise, water use (flushing of toilets, cafeteria use, showers etc.), sewer needs? Can the current infrastructure handle the volume? Pg. 19
- 19. Why is Library Lane used as a marker when it is on the east side of 395? Pg. 22
- 20. What if the 'proposed internal and external roadway improvements that will be in-place to serve the opening day traffic demand' do not work? Is there a contingency plan? Pg. 24
- 21. Who pays for the 'improvement of the existing walkways and addition of new sidewalks outside of the site? Have skywalks been considered? Pg. 27, Pg. 28
- 22. What will happen if the travel lanes on Seminary Rd. east of 395 do not handle the east bound traffic (shuttle buses headed to the King St. Metro)? There is a right turn only lane and a left turn only lane at Seminary and N. Howard St. That leaves only one through lane. The right turn only lane must remain for emergency vehicles turning to the INOVA Hospital.
- 23. 'WMATA staff and transit staff from the City of Alexandria have identified a number of possible transit improvements that could be implemented to serve the BRAC-133 population...' What are these and when would they be implemented? Pg. 35, Pg. 36.
- 24. What would the impact of private buss companies transporting BRAC-133 employees have on the local neighborhood traffic? Pg. 36
- 25. Who pays for trash pickup at the Transportation Center? Does the City of Alexandria have the funds to handle the new volume of trash that will be created by 6,400 plus employees? It appears at the current time we do not have enough funds to cover our current needs.
- 26. What are the combined numbers for the number of BRAC-133 employees from the King St. Metro and VRE at King St.? Pg. 39, Pg. 40
- 27. To distribute the shuttle trips from the King St. Metro station equitably I propose that shuttles be coded indicating which ones will use King St. to N. Beauregard to BRAC-133, Braddock Rd. to N. Beauregard to BRAC-133 and Seminary Rd. to N. Beauregard to BRAC-133. This would spread the traffic over three possible routes to help diminish the impact on only one route. Pg. 64
- 28. When will plans be final for the WHS DoD BRAC-133 shuttle program? Pg. 39
- 29. Will shuttles run on Saturdays and Sundays? If not what is the projection for SOV traffic using network roadways serving BRAC-133? Pg. 40

- 30. What criteria (data) will WHS use when analyzing shuttle rider ship trends? What amount of change will be required to warrant a change? Ten, fifty, one hundred plus or minus riders? Pg. 40
- 31. The numbers seem to indicate that with the set aside parking there will only be 2,970 parking spaces for BRAC-133 employees. That would indicate a need for more (777) BRAC-133 employees to use other modes of transportation to reach the 'goal' stated in the TMP. How will this be accomplished? Pg. 41 & 42
- 32. What was the traffic count for Seminary Rd from Quaker Lane west to N. Beauregard in the TIS/TMP study, March 31, 2003? Pg. 45
- 33. The last paragraph on page 45 states

'The report concludes that with the implementation of the proposed roadway improvements and 10 percent TMP trip reduction, all study (studied) intersections will operate at an acceptable LOS under full buildout and occupancy conditions'

And what happens if it does not work? Is there a Plan B?

- 34. Are three work shifts per day still planned for the BRAC-133 site? Pg. 47
- 35. Because the PB, April, 2009 study stated in the TIMP that the road improvements identified would not be adequate to handle the additional site generated traffic, what is proposed for the network of roads serving the BRAC-133 site? Are there plans to widen King St., Braddock Rd or Seminary Rd. from Quaker Lane to Kenmore Ave.? Pg. 49
- 36. How many of the potential '69 buses including public transit vehicles and DoD shuttles during both the AM and PM peak hours that could serve the Mark Center Transportation Center will be coming from the King St. Metro station? Pg. 49
- 37. The most recent Alternatives are not included on page 51. This needs to be updated to include the three new possibly Alternatives. Pg. 51
- 38. What environmental study has been done on the impact of the exhaust fumes from shuttle buses and additional traffic on the roadways from the King St. Metro station? Pg. 52
- 39. Has it been pointed out that the projected peak AM and PM hours are nearly identical to the start of the school day at the schools on Seminary Rd., King St. and Braddock Rd.? Has a safety evaluation been done to assess the impact on student safety? Pg. 61
- 40. On page 56, third paragraph, it is stated

"A single lane HOV ramp with a 450 foot long acceleration (or deceleration) lane allows direct access to Seminary Road from the north"

I do not believe this is accurate. There is not an HOV ramp access to Seminary Rd. 'from the north'. The HOV ramp heads north.

- 41. What is the 'proposed IDA Building', first line on page 64?
- 42. A correction is needed on page 65.
 - "...the I-95/395 HOV lanes, exit at the Pentagon, and turn around to travel along I-395 northbound (should be southbound) GP lanes to Mark Center.
- 43. I am suggesting that 'southbound' traffic on I-395 be encouraged to exit at King St. east to left at N. Beauregard. This would eliminate many left turns from Seminary Rd. onto N. Beauregard.
- 44. I am very concerned about the statement on page 74 "These degrading operations at the individual approaches will eventually lead to the failure of the overall intersection." Pg. 74, Pg. 85
- 45. As stated in the last paragraph on page 89, the traffic demand exceeds the available capacity that will result in spillover and traffic overflow that extends into downstream/upstream intersections impeding corridor wide traffic flow and operations.

In an emergency situation (terror attack, bombing etc.) how will emergency personnel be able to get to the site with the equipment needed to aid the injured? At peak AM and PM times how will emergency crews get to somebody having a heart attack?

- 46. Why did the study 'not examine or attempt to validate the concerns and/or assumptions made by citizens, nor has an effort been made to reference any studies that may validate citizen assumptions'? Pg. 92
- 47. What department is responsible for the 'facilities maintenance staff' that will maintain the cleanliness and preservation of the Transportation Center? Pg. 100
- 48. The BRAC Advisory Committee needs to be provided copies of the brochures, pamphlets, posters, and other marketing media for employees as well as the Orientation Handbook. Pg. 102, Pg. 103
- 49. The BRAC Advisory Committee needs to receive the results of the July 2010 resurvey of employees commuting patterns as well as the on in the winter of 2010. Pg. 104
- 50. Page 107 5.4.3 Overflow Management It is stated, "both street and off-street may be impacted by spillover. The parking areas that may be impacted can be categorized as parking lots where enforcement may be

challenging and/or where parking is unpermitted (not permitted) (i.e., residential community parking)."

iii. Issuing resident and guest parking permits to residential community members and implementing a strict towing policy for vehicles not displaying a permit is a suggested strategy.

What are the current plans for initiating this strategy in surrounding neighborhoods?

- 51. When will community members receive the 'hotline' number to voice a complaint about frequent parking violations? PG. 107
- 52. How will WHS insure that ALL special events participants will conform to parking protocol? Pg. 107
- 53. How and when would the surrounding community be informed of the expanding of the Mark Center Transportation Center? It seems this would further increase traffic congestion in the Mark Center area. Pg. 110
- 54. I am suggesting that the move of 27 organizations to BRAC-133 be done in phases over a yearlong period of time. This would allow evaluation of road improvements, pedestrian walkways, signage and transit plans. Adjustments could be made as organizations moved into the buildings. This seems like the only sensible way to avoid a complete breakdown of the roadways surrounding Mark Center.
- 55. Additional car-sharing vehicles **should not** be allowed. This would negate the push to lower SOV. This would be counter to the TMP goals of reducing single occupancy cars on the roadway network. Pg. 114
- 56. Variable work hours/flex time/telecommuting needs to be **strongly encouraged**. This could be a great benefit to reducing the Peak time congestion. PG. 114
- 57. WHS should conduct an annual survey of the neighborhood residents surrounding the BRAC-133 site along with their survey of employees. The results should be given to the BRAC Advisory Committee. Pg. 119
- 58. City Staff and The BRAC Advisory Committee should approve any amendments to the TMP. Pg. 121

The Palisades Homeowners Association writes:

1, Inaccurate determination of peak hour trips.

- a. The Plan identified "2,022 trips in the morning peak hour and 1,910 trips in the evening peak hours." (pg ES-3 and pg 94). However, Table 2-4, "Trip Projection of BRA 133 Employees with Proposed Mode Split" (pg 18) shows (assuming 90% employees being present) 3,288 single occupant vehicle trips, with another 208 trips for Carpool, Vanpool, and Slug personnel, for a total of 3,496 total
- b. Table 2-4 also shows a total of 3,743 Employee Parking Spaces, of which 3,530 are available for BRAC 133 Employees, leaving 34 (less than 1%) parking spaces available.
- c. This means there should be 3,496 vehicle trips in the morning....and a similar number in the evening.
- d. It appears the report erroneously took the Table 2-4 Trip Projections as "Round-Trip" rather than "Each Way".....resulting in a peak hour flow 50% of actual reality. This miscomputation has significant adverse ramifications.
- **2. Inadequate Peak Hour Processing.** Pg 30 says "...each proposed ID check point will process 350 vehicles per hour, a maximum of 700 vehicles during the highest peak hour demand." If 90% of traffic arrives during the peak hours of 0600-0900, then 90% of 3,496 equals 3,146, which equates to 1,049/hour. The TMP needs to address how this peak flow will be addressed and how to prevent additional traffic (and safety) issues from traffic queue build-up.

3. Slugging.

- a. The plan refers to a "pedestrian refuge area to promote slugging." (pg ES-2). Recommend the Plan flesh out this refuge area to better analyze projected traffic flow and impact. In particular, recommend it review the Pentagon refuge area to determine how to best organize and understand projected traffic flow. The Pentagon slugging area encompasses a significant amount of land and various allocation of slugging locations to maximize thru-put and matching of vehicle slug-lines and individual slugees. In particular they try differentiate between slugees heading west (I-66); those to the Springfield area ((-395) and those further south toward Prince William County/Fredericksburg (I-95).
- b. It is highly questionable whether the flow of slug lines within the constricted space available within the Mark Center will be conducive to efficient and effective slugging. A deeper analysis and understanding of this process is highly recommended. (Slugging is also addressed in para 5.6.3 on pg 112...but our comments remain valid).
- **4. Walking & Biking Employees.** Table 2-4 projects 4% of BRAC Employees (231 total) as either walking or biking. Recommend further study on the feasibility and safety for these personnel with the limited number of sidewalks and biking lanes available....especially with the very significant increase in vehicular traffic projected. Bikelanes, sidewalks, and pedestrian/bike walkways need to be considered and planned for. Pedestrian walkways should be reviewed within 2 mile radius. Bikelanes should be reviewed within a 10 mile radius.
- <u>5. Broader Regional Traffic Intersection Impact.</u> The impact of BRAC 133 will extend far beyond the immediate intersections next to the Mark Center (pg ES-3). There will be additional traffic coming

from the West (from Columbia Pike and Route 7....as well as Seminary Road and George Mason) as well as from the South (people exiting I-395 at Rt 235, or coming north on Van Dorn to cut over at Sanger Blvd to Beauregard) and from the East (from Maryland exiting Telegraph road to Rt 236, then North on Quaker Lane to Seminary Road West). These are just some examples of the regional impact BRAC 133 will have. The broader regional impact on traffic patterns should be studied and addressed.

- <u>**6.** Mid-Day Traffic Impact.</u> What is capacity of the Mark Center Cafeteria? If inadequate to meet the needs of the Mark Center population, how will that impact mid-Day traffic?
- **7.** Allocation of Parking Passes. Para 2.2 (pg 8) mentions federal employees account for 69% of the total employees. We assume the remaining 31% are Contractor employees? Will the be treated equally with the federal employees in allocating parking passes? If not, how will they be accounted for and what will their impact be to the surrounding communities as they struggle to find parking places? (Also addressed in para 5.4 on page 105)
- 8. Traffic Impact of Looking for Parking Places. Pg 17 says "Based on the projected mode split employee trips for a typical day (90 percent occupancy), it is estimated that a buffer of 34 additional parking spaces would be available to satisfy unexpected parking demand." This is less than 1% of the total number of available parking places which is a very marginal buffer. The TMP needs to address how these 34 spaces will be allocated between the North and South garages. It also needs to address the traffic delays associated with people looking for the last one or two spaces in a garage. And finally, it needs to address those times when the buffer is exhausted.....how will this overflow impact the local communities?
- **9.** Mission Impact due to Parking Constraints. Pg 26 says "Every visitor will be required to register in advance and receive approval from PFPA, at least one day prior to visiting the site." As someone who has had multiple tours at the Pentagon, I can assure you issues pop-up without giving that lead-time specified. The TMP needs to address adverse impact to the mission of personnel being unable to attend a meeting or give necessary input due to this administrative limitation.
- <u>10. Additional Bus Support.</u> An April 2009 study is referenced (pg 49) that concludes "... The analysist projects that the Mark Center Transportation Center could potentially be served by 69 buses including public transit vehicles and DoD shuttles during both the AM and PM peak hour."
 - a. Have there been any discussions (and agreements) with the activities who would be buying these buses
 - b. Has money been identified for these buses
 - c. There is a time lag between identifying a need and providing the resource. Has this timeframe been determined and planned for?
 - d. There is time required to integrate these buses into existing bus routes and adjust bus-stop schedules accordingly. Has this been considered and integrated into the plan?
 - e. Has the environmental (both pollution and traffic) impact of these additional buses been considered?
 - f. Has the scheduled usage of these buses at the Mark Center Transportation Center been considered and integrated into the overall schedule?

- g. If the above have been considered...it needs to be made visible to the public. If it has not been studied and considered, it needs to be.
- <u>11. DoD Shuttles</u>. Para 3.5.3 (pg 39) discusses DoD shuttles picking passengers up at the Orange, Yellow, and Blue Line Metro Stations.
 - a. Has DoD coordinated these proposed pick-ups with the Washington Metro?
 - b. Has consideration (especially by Washington Metro) been given to the probability of WHS personnel driving to a Metro Stop and parking there and catching a DoD Shuttle so that they don't have to fight the traffic and hassle of parking at the Mark Center? These persons would take parking capacity away from the Metro and deprive the Metro of revenue from people riding the Metro.
- 12. Unacceptable Levels of Service (LOS). Pg 73 (and Tables 4-12 and 4-13) show many intersections and lane grup movements operating at an unacceptable LOS currently. This will only get worse with the severe stress caused by BRAC 133. Pg 85 says "...These degrading operations at the individual intersection approaches will eventually lead to the failure of the overall intersection. In addition, the overall intersection at the Seminary Road and North Beauregard Street intersection operated at unacceptable levels under the projected morning and evening peak hour demands, with all the intersection approaches and lane group movements experiencing severed delay. ..." Since the BRAC improvements for traffic flow are minimal compared to the increase in traffic flow....catastrophic traffic impact is almost a certainty. The regional impact of this traffic must be considered.

13. Existing Mark Center Transportation Management Plan (pg 97)

Para 5.1 says "...the BRAC 133 TMP will consider the TDM strtegies detailed in the existing Mark Center Plaza 1A and 1B TMP (developed March 31, 2003)..." Using a 2003 document is absolutely unacceptable. Most of the previous studies were flawed, biased, superficial...or a combination of the above. Plus, traffic conditions have changed significantly since 2003. The final TMP must:

- a. Take into account current conditions
- b. Have accurate data
- c. Consider existing and planned infrastructure capacity
- d. Consider future development plans and
- e. Allow time for public review and comment
- **14. Traffic Flow.** As the TMP considers traffic flow into and out of the Mark Center, it is important to include traffic flow and patterns from the existing tenants: Institute for Defense Analysis (IDA), Center for Naval Analysis (CNA), the Hilton employees and guests, and the medical/commercial building.

Submitted by the Palisade Homeowners' Association Alexandria, VA Jennifer M. Porter, President

Jeffrey Grotte, City of Alexandria Resident, writes:

I appreciate the opportunity to respond to the draft transportation plan for BRAC-133. I work in Mark Center and commute by bicycle several days a week, whenever I can. I have done so for years. The flaw in the transportation plan with respect to bicycling is not the number of racks or the availability of showers, but the lack of bicycle access to the site. Only those who are comfortable riding in heavy traffic can get there now and the situation is likely to get worse. From no direction is bicycling easy and I don't consider riding on sidewalks an option. That is safe for neither bicycles nor pedestrians and none of the sidewalks in the area is wide enough or recognized for mixed use. Bicycles must and should be able to use the roadways.

From the southeast, once you are past Howard Road, you are riding among fast moving cars along Seminary (this is the route I take). The Plan suggests that "there is a pediestrian/bicycle bridge on the right side of Seminary Road going northbound that crosses over I-395." The sidewalk on the bridge is narrow, has a high drop on the road side, and cannot handle a bicycle and a pedestrian at the same time. I have no problems with this route now, but if the HOV lanes from 395 empty onto this bridge, it will be very difficult for bicycles to get to the left lane to turn into Mark Center Drive.

From the northwest, Seminary has four narrow lanes that make it difficult for cars to pass bicyclists safely. Beauregard street to the northeast is ridable, but only for those skilled in traffic.

From the southwest, one can come up Chambliss street. I am not familiar with that route but at least one of my colleagues takes it. I am not sure where one cuts over to Mark Center.

It is not surprising that Table 5-2 lists neither Beauregard nor Seminary as a bicycle route in spite of what the figures in Appendix E might imply. If the Plan were serious regarding bicycling as mode of transportation, there would be more in the Plan regarding road improvements to ensure bicycle access; I haven't read the whole thing from cover to cover, but, in spite of the discussion of bicycle friendly improvements on the site, there is little regarding improvements in access to the site, and from what I can tell of the proposed roadway modifications, the obstacles to bicycle commuting will increase.

I hope these comments are helpful, and I am happy to provide any additional information that I can.

Jeff Grotte

Dr. Patricia M. Hilgard, City of Alexandria Resident, writes:

- 1. What arrangements are the various "agencies" making (in terms of **report time**) to accommodate tieups in getting to and into the buildings? And around during the day? Will this **additional travel/wait time be on the government or the employee's time**? What about for irregular needs (medical appts, eg.) Likely to be more than 4/yr (when added to other emergencies, work late, etc) for the Guaranteed ride option. Will employees just have to take the whole day off (on their own time) for something that should be only a few hours???
- 2. Numbers seem to be very optimistic in terms of # of people/vehicles processed. For example, in being inspected and entering garage. How many lanes will there be? (700/hr translated into less than 5 sec/vehicle). Also 700/hr does not address the **head time** for attempted entry when many are trying to report to work **at the same time**.
- 3. Guaranteed ride program. What happens to the employee who needs to work added hours more frequently than 4 times a year? (more typical situation, I would suspect). Also, not conducive to taking public transportation at a late hour(or after the shuttles end).
- 4. Tables suggest an excess of parking only when workforce is at or less than 90% for a given day. Also that there will only be a set number of permits (no greater than number of spaces). *I don't see how these two will match up when you have carpooling*. And what is the impact of having days when everyone needs to be there? Also the suggestion that there will be spots, though not guaranteed (on any given day) for some drivers. What happens when there turns out to be NO spot, after the driver arrives? What is the meaning of the section when you say you will have a backup plan and take care of this very problem? And what happens if the Moran proposal goes through (which would prohibit alternative paid parking?)
- 5. The **visitors/meetings/conferences** situation does not sound well thought out, either qualitatively of quantitatively. I think this will be a mess, especially if there are many frequent, or large meetings on site (which you already suggest will happen). Perhaps more so for meetings that do not span the day. Also for meetings which are not scheduled early enough to attempt a 24-hr advance parking (application) spot. And "park and ride" spaces at Metro stops are generally not available after early AM hours.
- 6. Garage reserved spaces for govt vehicles, special fuel cars, etc. Will there be **designated spaces equipped and assigned** to accommodate vehicles which require **electric recharging** during their parking time?
- 7. **Handicapped parking**. Your 48 spaces sound ridiculously low (less than 1% of the workforce) to start with. Plus, this, in an age where a) more disabled people work/need to work, b) where people are working to a later age = more disabilities, and c) where the government will need to be providing more jobs for the Iraq-era disabled veterans and civilians. What realistic plans will you have to accommodate these factors? Then, add the people who will have temporary impairing conditions (medical, accidents, etc). **The TMP seriously needs to address this situation.**

8. There was also the scenario of improving outside accessibility (walkways) for the disabled community. It was not clear what the geographical/topographical extent of these modifications are planned, so I cannot begin to comment on this point.

Ms. Luann Mason, Kingstowne, Fairfax County writes:

I live in the Kingstowne section of Fairfax County, which is just south of Alexandria. My neighbors and I are now concerned with a few comments made on the Brac TMP. First I read through most of the TMP and all of Alexandria's comments. There were some good things that Alexandria mentioned including the comments on mode splits, transit, and vanpools but just before vanpools Alexandria has a comment about providing shuttle service to Franconia Springfield. This really concerns me and my neighbors as first there is currently no where to park, these people going to Brac will take up spaces that we use to ride the metro, and driving from that station to the Brac location on 395 takes a long time due to traffic. So my question is will Alexandria pay to add parking spaces to the metro station. I would think that someone in Alexandria has common sense to know that running shuttles on 395 in traffic is a stupid idea especially since they cannot run from the metro station to the Brac facility by HOV so does Alexandria plan to run those shuttles through our neighborhood? Traffic is already bad in the morning and afternoon along S. Van Dorn and adding those shuttles would just increase traffic. I thought the goal was to decrease traffic and all Alexandria is doing is putting the burden on those that live down here if that is the plan. Also those shuttles would get stuck in traffic on van dorn. The TMP has something about service from the King metro station and it is only a 7 minute trip from our metro station to King metro station so people would not even concern using a shuttle from our station because it would be quicker for them to just get off on King street and they would actually be using the metro station instead of just parking there.